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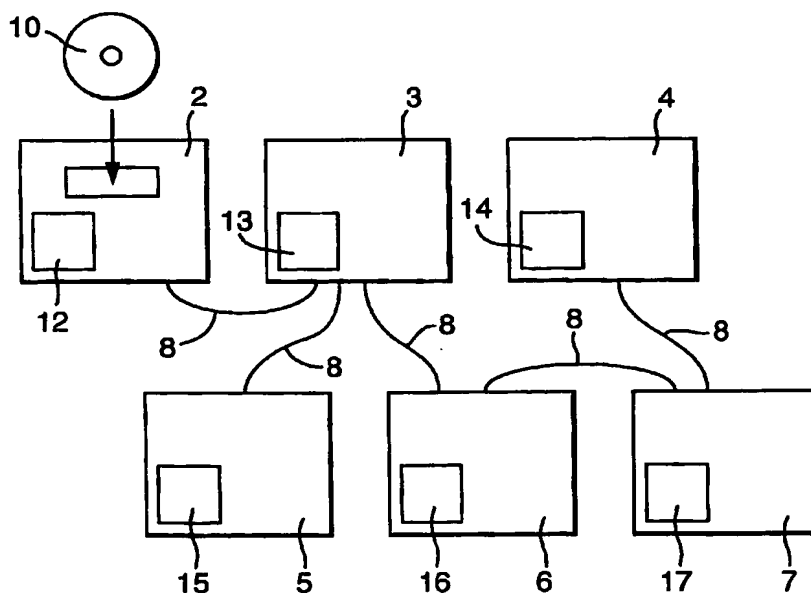
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[Continued on next page]

(54) Title: **UPGRADING SOFTWARE OF NETWORKED DEVICES**



(57) Abstract: Upgrading of devices in a network, such as an IEEE (1394) network, of digitally connected devices, such as AV devices, is performed using a reproduction device for reproducing a recording medium insertable in the reproduction device. A controller for controlling the reproduction device is arranged, on insertion in the reproduction device of a recording medium, to detect if the inserted recording medium has recorded thereon upgrade software for upgrading a target device in the network. If so, the controller causes the target device to be upgraded by the upgrade software.



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INTERNATIONAL SEARCH REPORT

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A. CLASSIFICATION OF SUBJECT MATTER
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According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

IPC 7 G06F

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practical, search terms used)

EPO-Internal, IBM-TDB, WPI Data, INSPEC, COMPENDEX

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	US 6 230 319 B1 (GOLDMAN PHILLIP Y ET AL) 8 May 2001 (2001-05-08) column 2, line 9 - line 12; figures 7,8 column 2, line 29 - line 36 column 4, line 65 - column 5, line 13 column 8, line 8 - line 19 -----	1-11
A	EP 1 197 839 A (HEWLETT PACKARD CO) 17 April 2002 (2002-04-17) paragraphs '0006!', '0064!; figures 12-14 -----	1-11

☐ Further documents are listed in the continuation of box C.☒ Patent family members are listed in annex.

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Information on patent family members

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Patent document cited in search report		Publication date	Patent family member(s)	Publication date
US 6230319	B1	08-05-2001	US 5940074 A	17-08-1999
			US 6034689 A	07-03-2000
			US 5918013 A	29-06-1999
			AU 5261298 A	10-06-1998
			EP 0848341 A2	17-06-1998
			JP 10198571 A	31-07-1998
			WO 9823059 A2	28-05-1998
			US 6023268 A	08-02-2000
			US 6259442 B1	10-07-2001
			US 6473099 B1	29-10-2002
			US 2002054069 A1	09-05-2002
			AU 3139197 A	05-01-1998
			EP 0811940 A2	10-12-1997
			JP 10171842 A	26-06-1998
			KR 274135 B1	15-12-2000
			US 2001003823 A1	14-06-2001
			WO 9747143 A2	11-12-1997
			US 6133913 A	17-10-2000
			US 6496205 B1	17-12-2002
			US 6008836 A	28-12-1999
			US 6005563 A	21-12-1999
			US 5945991 A	31-08-1999
			US 2002021308 A1	21-02-2002
			US 5974461 A	26-10-1999
			AU 3375197 A	05-01-1998
			EP 0811939 A2	10-12-1997
			JP 10228437 A	25-08-1998
			KR 274738 B1	15-12-2000
			US 6647421 B1	11-11-2003
			US 6505232 B1	07-01-2003
			WO 9746943 A1	11-12-1997
			US 6141693 A	31-10-2000
			US 2003014499 A1	16-01-2003
			US 6330606 B1	11-12-2001
			US 6311207 B1	30-10-2001
			US 6332157 B1	18-12-2001
			US 6308222 B1	23-10-2001
			US 6073168 A	06-06-2000
			US 5935207 A	10-08-1999
			US 5996022 A	30-11-1999
			US 2002013812 A1	31-01-2002
EP 1197839	A	17-04-2002	EP 1197839 A2	17-04-2002
			JP 2002197183 A	12-07-2002